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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/507,123	10/20/2004	Rudy Van Reeth	KOB	8899

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EXAMINER

PHILLIPS, FORREST M

ART UNIT PAPER NUMBER

2837

DATE MAILED: 08/29/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/507,123

Applicant(s)

VAN REETH, RUDY

Examiner

Forrest M. Phillips

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2837

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-10 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>12/01/04</u> . | 6) <input type="checkbox"/> Other: ____. |

DETAILED ACTION

Claim Objections

Claims 4 and 5 are objected to because of the following informalities: in claims 4 and 5 "at least 90% of said first and/or second cavities are completely filled (claim 4) are partially filled (claim 5)." It is not entirely understood by examiner as drafted, currently the claim is understood best by examiner as meaning that at least 9 out of every 10 cavities are completely filled in the case of claim 4 and partially filled in the case of claim 5, rather than 90% of each and every cavity id completely or partially filled. Claims have been treated on merits as best understood by examiner. Appropriate correction is required.

Claims 1-10 are objected to as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. The use of and/or in claims renders the claim indefinite., all instances of and/or are being treated as or.

Claims 8 and 9 are objected to because of the following informalities: Method claims must include all the steps of the method, in this instance all the methods of the manufacturing, and forming. As currently written claims 8 and 9 are dependant upon claim 1 which is a device or apparatus claim. Appropriate correction is required.

Claim 10 is objected to because of the following informalities: typographical error in last line, it is believed by examiner that the last line is intended to read: used as a traffic load carrying construction element.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-2,4-5 are rejected under 35 U.S.C. 103(a) as being unpatentable over D'Antonio et al.(US4964486) in view of Kleinschmidt (US3837426).

With respect to claim 1 D'Antonio discloses acoustic construction element comprising sound insulating cavities (25, 27, 29, 31, 33, and 35 in figure 3) having a constant shape along an axis parallel to the exposed surfaces of the construction element, at least part of said cavities being first cavities (25, 29, 31 and 35 in figure 3) and at least part of said cavities being second cavities having substantially constant width over their entire length (27 and 33 in figure 3) wherein at least part of said first cavities and at least part of second cavities have different depths (see figure 3); at least part of said first cavities have different internal volumes or different shapes.

D'Antonio does not disclose first cavities comprising a first portion, situated closest to the external surface of the element, having a smaller width than the maximum width of a second, internal portion of the cavity, or at least part of said first or second cavities are completely or partially filled with sound insulating material.

Kleinschmidt however discloses an acoustic construction element comprising cavities having a first portion (32 in figure 2) situated closest to the external surface of

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the element, having a smaller width than the maximum width of a second internal portion (14 in figure 2) of the cavity, or at least part of said first or second cavities are completely or partially filled with sound absorbing material (38 in figure 2).

At the time of the invention it would have been obvious to one of ordinary skill in the art to combine the teachings of Kleinschmidt to have portions with differing widths and sound absorbing material with the construction element of D'Antonio to provide greater sound attenuation.

With respect to claim 2 D'Antonio further discloses wherein at least part of the first cavities have an angular shape (refer to figure 3).

With respect to claim 4 Kleinschmidt further discloses wherein a portion of the cavities are completely filled with sound absorbing material (refer to figure 4). D'Antonio in view of Kleinschmidt discloses the claimed invention except for at least 90% of the cavities being completely filled. It would have been obvious to one of ordinary skill in the art at the time the invention was made to have 90% of the cavities completely filled, since it has been held that discovering an optimum value of a result effective variable involves only routine skill in the art. In re Boesch, 617 F.2d 272, 205 USPQ 215 (CCPA 1980).

With respect to claim 5 Kleinschmidt discloses wherein a portion of the cavities are partially filled with sound absorbing material (figures 2 and 4). It would have been obvious to one of ordinary skill in the art to partially fill at least 90% of the cavities.

With respect to claims 8 and 9 the method of forming a device is not germane to the issue of patentability of the device itself. Therefore, these limitations have not been given patentable weight.

With respect to claim 10 D'Antonia discloses a masonry block which would be useable as a traffic load carrying construction element. Also it has been held that a recitation with respect to the manner in which a claimed apparatus is intended to be employed does not differentiate the claimed apparatus from a prior art apparatus satisfying the claimed structural limitations. Ex Parte Masham, 2 USPQ F. 2d 1647 (1987).

Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over D'Antonio in view of Kleinschmidt as applied to claim 1 above, and further in view of Louis (FR2746831).

D'Antonio in view of Kleinschmidt discloses the acoustic construction element of claim 1.

D'Ansonio in view of Kleinschmidt does not disclose wherein the at least part of the first cavities have a pseudo-angular shape.

Louis discloses (5 in figure 2) a cavity used in a sound absorbing block having a pseudo-angular shape.

At the time of the invention it would have been obvious to one of ordinary skill in the art to combine the use of numerous shapes including the pseudo-angular shape as taught by Louis with the construction element of D'Antonia in view of Kleinschmidt to

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provide multiple resonator volumes enclosed in the same space physically in each block.

Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over D'Antonio in view of Kleinschmidt as applied to claim 1 above, and further in view of DE 19741282.

D'Antonio in view of Kleinschmidt disclose the construction element of claim 1 but does not disclose the use of a foamed mineral product.

The German patent discloses the use of a foamed mineral product as an acoustic sound absorber as applicant has cited on page 3 of specification.

At the time of the invention it would have been obvious to one of ordinary skill in the art to combine the use of a foamed mineral product as taught by the German patent with the acoustic construction element of D'Antonio in view of Kleinschmidt for the purpose of sound absorption using a known material.

Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over D'Antonio in view of Kleinschmidt as applied to claim 1 above, and further in view of DE29802517U.

D'Antonio in view of Kleinschmidt discloses the construction element of claim 1, but does not disclose the use of foamed clay, glass or perlite.

Foamed clay is a known material used as a sound absorber as is demonstrated by DE 29802517U (third paragraph of Basic Abstract in DERWENT document).

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At the time of the invention it would have been obvious to one of ordinary skill in the art to use foamed clay as a filler material for the construction element of D'Antonio in view of Kleinschmidt for the purpose of sound absorption.

Also it has been held to be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious design choice. In re Leshin, 125 USPQ 416.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. D'Antonio (US6772859); and Mastumoto (US4160491).


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Forrest M. Phillips whose telephone number is 5712729020. The examiner can normally be reached on Monday through Friday 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lincoln Donovan can be reached on 5712721988. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

FP


LINCOLN DONOVAN
SUPERVISORY PATENT EXAMINER